

UNITED STATES DISTRICT COURT  
NORTHERN DISTRICT OF TEXAS  
DALLAS DIVISION

SOUTHWESTERN BELL TELEPHONE,	§	
L.P., <i>et al.</i> ,	§	
Plaintiffs,	§	
	§	
v.	§	CIVIL ACTION NO. 3: 04-CV-0669-B
	§	ECF
ARTHUR COLLINS, INC.,	§	
	§	
Defendant.	§	

MEMORANDUM ORDER

Before the Court are Arthur Collins, Inc.'s ("Collins") Motion for Summary Judgment (Partial) of Southwestern Bell Telephone, L.P.'s Direct, Literal Infringement (doc. 358), Fujitsu Network Communications, Inc.'s ("Fujitsu") Motion for Partial Summary Judgment of Non-Infringement (doc. 438), and Southwestern Bell Telephone, L.P.'s ("Southwestern Bell") Motion for Summary Judgment of No Infringement, Both Literal and By Equivalents (doc. 440). Because there is no genuine issue of material fact as to literal infringement or infringement under the doctrine of equivalents by Fujitsu or literal infringement by Southwestern Bell, the Court GRANTS Plaintiffs' motions on those issues. Because Collins is no longer asserting infringement of the '907 patent, infringement of the '589 patent by Fujitsu's wavelength division multiplexers, or contributory infringement by Fujitsu, the Court DISMISSES these claims as withdrawn. Finally, because there remain genuine issues of material fact as to the other infringement claims, the Court DENIES the remainder of the motions.

## I. BACKGROUND

This declaratory judgment action concerns two patents Collins holds for a dynamically reconfigurable time space time switch (“DRTST”): 4,701,907 (“the ‘907 patent”) and 4,797,589 (“the ‘589 patent”). According to Southwestern Bell, Collins has asserted that switching systems in Southwestern Bell’s central offices infringe the patents-in-suit and has threatened suit for infringement unless the company purchases a license from Collins. (Am. Compl. ¶¶ 10-11) Southwestern Bell originally filed suit on March 31, 2004, seeking a declaratory judgment of non-infringement and invalidity of the patents-in-suit. (doc. 1) In its answer, Collins included a counterclaim of infringement against Southwestern Bell and requested compensatory damages, treble damages, and an injunction. (Ans. & Countercl. ¶¶ 7-11) In November 2004, Fujitsu moved to intervene in this suit based upon allegations of infringement made by Collins outside the context of the instant suit as well as potential indemnity obligations to Southwestern Bell. (Mot. to Intervene at 3) The Court granted Fujitsu leave to intervene in January 2005. (doc. 50)

After holding a *Markman* hearing, the Court issued its Memorandum Opinion and Order on Claim Construction in which it construed six terms integral to the determination of this case and the instant motions. (doc. 270) The claims were construed as follows:

- (1) “connected and connectable” – These terms mean “directly joined to one another within the same unitary piece of equipment without any intervening equipment.”
- (2) “unified structure” – Although not a claim term, the Court defines the term “unified structure” to mean “a consolidated structure with all components directly connected to one another.”
- (3) “bypass” – “Bypass” means “a structure and path by which data channels completely go around and in no respect go through the TST switch.”

- (4) “control store” – “A ‘control store’ is included within a single unified DRTST switching unit that includes a memory, processor, and operating software that determines (1) which data circulating on the network loop is to be selected and diverted to the TST switch of a given switching node; (2) how that data passes through the TST switch; (3) which data is output from the TST switch back onto the network loop; and (4) which data is to bypass the TST switch of that node.”
- (5) “means for measuring” – The Court finds that this term is not capable of construction.
- (6) “direction of the timing adjustment interval” – This term means “[t]he timing adjustment control command signal is fed in a reverse direction from the data signal; that is, from a downstream digital switching unit to an upstream digital switching unit, in a direction opposite the data flow.”

(Mem. Op. and Order on Claim Constr. at 30-31)

On February 23, 2006, Collins moved for summary judgment of Southwestern Bell’s direct, literal infringement of the ‘589 patent. (doc. 358) Collins asserts only claims 1, 2, 4-6, and 10-13 of the ‘589 patent and insists that Southwestern Bell infringes these claims connecting Fujitsu add-drop multiplexers (“ADMs”) to digital cross-connects (“DCSs”) manufactured by Tellabs, Inc. within its synchronous optical networks (“SONET”). (Collins’s Mot. for Summ. J. (“Collins’s Mot.”) at 1-2) Southwestern Bell contests the motion and has filed its own Motion for Summary Judgment of No Infringement, Both Literal and By Equivalents. (doc. 440) Due to its unique knowledge of the ADMs it manufactures, Fujitsu filed its own response in opposition to Collins’s Motion. (doc. 399) Additionally, Fujitsu has filed a Motion for Summary Judgment of Non-Infringement as to itself and its products. (doc. 438) Fujitsu asserts that its own devices do not infringe the ‘589 and ‘907 patents, that its customers do not infringe the ‘589 patent, that it lacks the requisite intent for inducement or contributory infringement, and that the substantial non-infringing uses of its ADMs also defeat any claims of contributory infringement. (Fujitsu’s Mot. for Partial Summ. J. (“Fujitsu’s

Mot.”) at 1-2) The parties have briefed the issues, and the Court now turns to the merits of its decision.

## II. LEGAL STANDARD

A court may grant summary judgment when there is no genuine issue as to any material fact and the moving party is entitled to judgment as a matter of law. FED. R. CIV. P. 56(c); *Petrolite Corp. v. Baker Hughes Inc.*, 96 F.3d 1423, 1425 (Fed. Cir. 1996). The burden lies with the movant to show that no genuine material issue of fact exists. *Conroy v. Reebok Int’l, Ltd.*, 14 F.3d 1570, 1575 (Fed. Cir. 1994). If the evidence submitted would allow a reasonable jury to return a verdict for the non-movant, a genuine issue remains and the court cannot grant summary judgment. *Anderson v. Liberty Lobby, Inc.*, 477 U.S. 242, 248 (1986). Alternatively, a movant may meet its burden by showing that its opponent failed to present sufficient evidence to establish an essential element of the case where the opponent bears the burden of proof for that element. *Celotex Corp. v. Catrett*, 477 U.S. 317, 322-23 (1986). The Court now turns to the parties’ arguments.

## III. THE ‘907 PATENT

Fujitsu moves for summary judgment as to infringement of the ‘907 patent, arguing that Collins has presented no evidence and fails to make out a case of infringement of that patent. (Fujitsu’s Mot. at 28-29) Correspondingly, Southwestern Bell argues that the Court should grant summary judgment of no infringement of the ‘907 patent because of the patent’s indefiniteness. (Southwestern Bell’s Mot. for Summ. J. (“Southwestern Bell’s Mot.”) at 6-7) Southwestern Bell reasons that the Court’s construction of the claim term “means for measuring at least one timing adjustment interval . . .” as “not capable of construction” precludes Collins from demonstrating that a structure within Southwestern Bell’s network satisfies this claim term. (*Id.* at 6) Collins responds

that it is no longer asserting the '907 patent but reserves its right to appeal the claim construction decision. (Collins's Resp. to Pls.' Mot. ("Collins's Resp.") at 18) Because Collins has withdrawn its infringement claims as to the '907 patent, the Court DISMISSES those claims.

#### **IV. THE '589 PATENT**

##### **A. Preliminary Issues**

###### **1. Discovery Sanctions**

In its Motion for Summary Judgment, Collins requests that the Court sanction Southwestern Bell for its interrogatory responses regarding infringement. (Collins's Mot. at 4-7) A motion for summary judgment is not the proper vehicle through which to address discovery disputes; thus the Court will not consider the sanctions request.

###### **2. Motion to Strike Expert Report**

In its response to Collins's Motion for Summary Judgment, Fujitsu moves to strike the expert reports of Wayne Grover and Glen DeCou on the grounds that they are not affidavits as required by Federal Rule of Civil Procedure 56. (Fujitsu's Response to Collins's Mot. at 2) Collins counters that the expert reports can be used to support its summary judgment motion because they were made under penalty of perjury. (Collins's Reply at 1) Collins is correct— 28 U.S.C. § 1746 permits an unsworn declaration or statement to substitute for an affidavit when it is dated and subscribed by the declarant as true under penalty of perjury. Therefore, the Court DENIES Fujitsu's Motion to Strike.

##### **B. Infringement by Fujitsu**

###### **1. Literal and Equivalent Infringement**

###### **a. Infringement by Add-Drop Multiplexers**

In its answer to Fujitsu's Complaint-in-Intervention, Collins asserted a counterclaim of direct

infringement<sup>1</sup> of the '589 patent. Fujitsu moves for summary judgment of no infringement based upon a letter by Collins's counsel agreeing to waive that claim. (Fujitsu's Mot. at 13) Because the parties never moved the Court to dismiss those infringement claims and no subsequent action was taken, Collins may continue to pursue its direct infringement claims against Fujitsu. Fujitsu additionally argues that it is entitled to summary judgment of no infringement because its ADMs lack essential elements of the '589 patent's claims, such as a TST switch. (*Id.* at 12) Collins's response only addresses infringement under the doctrine of equivalents. (Collins's Resp. to Fujitsu's Mot. at 17) For this reason, the Court GRANTS summary judgment in favor of Fujitsu on the issue of direct, *literal* infringement.

Fujitsu insists that its ADMs cannot directly infringe the claims of the '589 patent because they do not include any space switching, and the patent requires a time-space-time switch. (Fujitsu's Mot. at 12) Collins maintains that Fujitsu's FlashWave 4300 and 4500 ADMs infringe the claims of the '589 patent under the doctrine of equivalents and that the ADMs contain space switching after two time switches. (Collins's Resp. at 17; Appx. to Resp. at 23-24) While Collins cites to the report of its expert, Dr. Grover, and a conclusory claim chart for this proposition, it provides the Court no additional proof of the existence of space switching in Fujitsu's ADMs. (Collins's Resp. at 17) An unsupported expert report is hardly enough to create a genuine issue of material fact as to the non-existence of space switching within Fujitsu's ADMs. *See generally, Boyd v. State Farm Ins. Cos.*, 158 F.3d 326, 331 (5<sup>th</sup> Cir. 1998). For this reason, the Court GRANTS summary judgment for Fujitsu on the issue of infringement under the doctrine of equivalents.

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<sup>1</sup>A patent can be directly infringed either literally or under the doctrine of equivalents.

Even if Collins was able to prove that Fujitsu's ADMs contain space stages and that there is no issue of material fact as to their existence, the Court still would grant summary judgment for Fujitsu on infringement by equivalents. To succeed on a claim for infringement under the doctrine of equivalents, a party must show that every element of the patent is "literally or equivalently present in the accused device." *Sage Prods., Inc. v. Devon Indus., Inc.*, 126 F.3d 1420, 1423 (Fed. Cir. 1997). This means that while an accused device may not exhibit every claim element exactly, there remain only insubstantial differences between the missing claim element and the corresponding characteristics of the accused device. *Id.* To prove equivalence, a party must show that the accused device "performs substantially the same function in substantially the same way to obtain the same result." *Graver Tank & Mfg. Co., Inc. v. Linde Air Prods. Co.*, 339 U.S. 605, 608 (1950) (quoting *Sanitary Refrigerator Co. v. Winters*, 280 U.S. 30, 42 (1929)). The "all limitations" rule constrains the application of the doctrine of equivalents, requiring the Court to determine equivalence on a claim limitation by claim limitation basis rather than just considering the invention as a whole. *Freedman Seating Co. v. Am. Seating Co.*, 420 F.3d 1350, 1358 (Fed. Cir. 2005). Further, a court cannot find, as a matter of law, equivalence between an element of the accused device and a limitation of the patented invention "if such a finding would entirely vitiate the limitation." *Id.* The Federal Circuit clarified that vitiation requires "not a 'subtle difference in degree,' but rather, 'a clear, substantial difference in kind.'" *Id.* at 1361 (quoting *Ethicon Endo-Surgery, Inc. v. U.S. Surgical Corp.*, 149 F.3d 1309, 1321 (Fed. Cir. 1998)). In the instant case, a finding that Fujitsu's alleged time-time-space switch is equivalent to the patent's time-space-time switch would vitiate the TST switch claim limitation in the '589 patent.

The parties agreed to be bound by the Federal Circuit's construction of "TST switch": "a

structure with time-switch input and output stages, and with one or more *intermediate* space-switch stages containing only structure for space translation.” *Arthur A. Collins, Inc. v. Northern Telecom Ltd.*, 216 F.3d 1042, 1045 (Fed. Cir. 2000) (emphasis added). The supposed TTS switch in Fujitsu’s ADMs is not an “insubstantial change” but rather a change in the fundamental structure of the patented switch. Because the difference is not a subtle difference of degree, but instead a difference in kind, a finding of infringement by equivalents would render meaningless the TST claim limitation expressly requiring the placement of at least one intermediate space stage *between* two time stages. Thus, the lack of an equivalent to a TST switch prevents Fujitsu from infringing the ‘589 patent under the doctrine of equivalents.

#### **b. Infringement by Wavelength Division Multiplexers**

Fujitsu also manufactures wavelength division multiplexers that it claims do not infringe the ‘589 patent because they are passive and perform no switching function. (Fujitsu’s Mot. at 8) Collins states that it is not asserting infringement by this class of devices and declares the issue moot. (Collins’s Resp. at 17) Fujitsu nonetheless insists that it is entitled to summary judgment of non-infringement. (Fujitsu’s Mot. at 9) Because Collins is no longer asserting infringement of the ‘589 patent by Fujitsu’s wavelength division multiplexers, the Court DISMISSES these claims as withdrawn.

#### **2. Direct Infringement by Fujitsu’s Customers**

In an effort to defend against claims of induced infringement, Fujitsu also requests summary judgment that its customers, including Southwestern Bell, do not directly infringe the ‘589 patent. (Fujitsu’s Mot. at 13) Direct infringement by Southwestern Bell will be addressed below. No other Fujitsu customers are a party to this suit, and the Court will not address those customers’



infringement or non-infringement in their absence. Therefore, the Court DENIES Fujitsu's Motion for Summary Judgment on this issue.

### **3. Induced Infringement by Fujitsu**

Further, Fujitsu moves for summary judgment that it has not induced infringement of the '589 patent through the sales of its ADMs. (Fujitsu's Mot. at 23-27) For Collins to prevail on its claim for inducement of infringement, it must show that there has been direct infringement of the '589 patent and that Fujitsu "knowingly induced infringement and possessed specific intent to encourage another's infringement." *Minn. Min. & Mfg. Co. v. Chemque, Inc.*, 303 F.3d 1294, 1304-05 (Fed. Cir. 2002). To clarify, Collins must show that "[Fujitsu's] actions induced infringing acts *and* that [Fujitsu] knew or should have known [its] actions would induce actual infringements." *Id.* at 1305. Despite Collins's submission of a press release and deposition testimony in support of its claims, Fujitsu maintains that Collins has not provided sufficient evidence on this issue, particularly as to Fujitsu's intent to induce infringement. (Fujitsu's Reply at 13) At this juncture, the Court cannot resolve the inducement claims because direct infringement, a necessary prerequisite to inducement of infringement, has not been established. As discussed below, Southwestern Bell has not literally infringed the '589 patent. Nevertheless, genuine issues of material fact exist as to whether Southwestern Bell infringes under the doctrine of equivalents. Because of these remaining factual issues, the Court DENIES Fujitsu's motion for a judgment that it has not induced infringement of the '589 patent through the sales of its ADMs.

### **4. Contributory Infringement by Fujitsu**

Fujitsu also moves for summary judgment on the issue of contributory infringement. Fujitsu contends that Collins's claim of contributory infringement fails because there is no evidence that it

possesses the requisite intent for contributory infringement and because its devices are staple items of commerce that have “substantial non-infringing uses.” (Fujitsu’s Mot. at 23, 27) Collins responds by declaring that it will no longer assert contributory infringement against Fujitsu. (Collins’s Resp. at 22) Accordingly, the Court DISMISSES this claim as withdrawn.

**C. Literal and Equivalent Infringement by Southwestern Bell**

**1. Literal Infringement**

Both Collins and Southwestern Bell move for summary judgment on the issue of direct, literal infringement by Southwestern Bell. An accused device literally infringes a patent when it contains “every limitation in the asserted claims.” *Mas-Hamilton Group v. LaGard, Inc.*, 156 F.3d 1206, 1211 (Fed. Cir. 1998). A court cannot find literal infringement if one of the limitations is not present in the accused device or if the device does not include the limitation exactly as it is claimed in the patent. *Id.* Collins contends that the combination of a Fujitsu ADM connected to a Tellabs DCS in Southwestern Bell’s SONET network contains all the required components and performs all of the functions set forth in the ‘589 patent. (Collins’s Mot. at 7-12) Southwestern Bell refutes Collins’s assertions, highlighting many components of the ‘589 patent that it believes are missing from its SONET network. (Southwestern Bell’s Mot. at 8-30)

Of particular importance to summary judgment on this issue is Southwestern Bell’s contention that the accused ADM/DCS combination lacks a “control store.” The control store limitation appears in claims 1 and 4 of the ‘589 patent, the only independent claims in the patent. In its claim construction order, this Court explained that

“A ‘control store’ is included within a single unified DRTST switching unit that includes a memory, processor, and operating software that determines (1) which data circulating on the network loop is to be selected and diverted to the TST switch of

a given switching node; (2) how that data passes through the TST switch; (3) which data is output from the TST switch back onto the network loop; and (4) which data is to bypass the TST switch of that node.”

(Mem. Op. and Order on Claim Constr. at 25) Southwestern Bell does not agree with Collins’s statements that the ADMs and DCSs employed in the SONET system each perform some of the functions required in the claim construction; however, this issue of fact is not material because it does not affect the ultimate outcome of the infringement issue in this suit.

Even assuming that the ADM performs functions (1) and (4) and that the DCS performs functions (2) and (3) as Collins suggests, the accused device does not contain a control store that satisfies the Court’s construction of that term. (See Collins’s Mot. at 11) Although Collins seems to have gleaned from the Court’s construction of “control store” that multiple control stores, each performing some but not all of the four functions listed above, are permissible, the Court did not intend to allow more than one device to comprise a control store. When determining how to construe this term, the Court considered the construction presented above, which was proposed by Plaintiffs, as well as an alternate construction proposed by Collins:

A control store is a memory that responds to commands received through the control channels to control local drop, insert, bypass and other switching operations. A single control store may be used to control these operations, and the operations of the digital switch (TST switch), or separate, distributed control stores may be used for these different operations.

(Ex. A to Parties’ Joint Claim Constr. Statement) The Court rejected Collins’s proposal, which would have allowed the required functions to be distributed across multiple control stores, in favor of a construction that would place more reasonable limits on the scope of the ‘589 patent. Instead, the Court adopted the construction requiring one device to perform all four of the aforementioned functions. Nevertheless, the Court’s construction does not limit each DRTST to containing a single

control store. The Federal Circuit has repeatedly explained that “an indefinite article ‘a’ or ‘an’ in patent parlance carries the meaning of ‘one or more’ in open-ended claims containing the transitional phrase ‘comprising’.” *Scanner Techs. Corp. v. Icos Vision Sys. Corp., N.V.*, 365 F.3d 1299, 1304 (Fed. Cir. 2004) (quoting *KCJ Corp. v. Kinetic Concepts, Inc.*, 223 F.3d 1351, 1356 (Fed. Cir. 2000)). This means that while the ‘589 patent does not place a limit on the number of control stores a DRTST or infringing device may contain, it does require *each* of those control stores to be able to perform all four functions enumerated in claims 1 and 4. Because there is no genuine issue of material fact that the control stores in the Fujitsu ADM and Tellabs DCS only perform some of the requisite functions, the combination of the two devices does not literally infringe the ‘589 patent. Thus, the Court GRANTS summary judgment for Southwestern Bell on the issue of literal infringement and DENIES Collins’s motion on the same issue.

## **2. Infringement Under the Doctrine of Equivalents**

Additionally, Southwestern Bell seeks summary judgement of no infringement under the doctrine of equivalents. Whether the ADM/DCS combination infringes the ‘589 patent under the doctrine of equivalents continues to be hotly contested by all parties. The Court cannot decide this infringement issue on summary judgment because there remain too many genuine issues of material fact, such as whether the alleged distributed control store in the ADM/DCS combination is equivalent to the control store claimed in the ‘589 patent. For that reason, the Court DENIES Southwestern Bell’s motion as to infringement under the doctrine of equivalents.

## **3. Equitable Doctrine of Laches**

In its motion, Southwestern Bell also moves for summary judgment on the basis of the equitable doctrine of laches; however, neither party briefed the issue. Therefore, the Court DENIES


Southwestern Bell's motion as to laches.

## V. CONCLUSION

For the reasons discussed above, the Court DISMISSES as withdrawn Collins's claims of infringement of the '907 patent, direct infringement of the '589 patent by Fujitsu's wavelength division multiplexers, and contributory infringement by Fujitsu. Further, the Court GRANTS Fujitsu's motion as to direct infringement of the '589 patent and GRANTS Southwestern Bell's motion as to literal infringement of the '589 patent. In turn, the Court DENIES Collins's motion in its entirety; DENIES Fujitsu's motion as to direct infringement by Fujitsu's customers and induced infringement; and DENIES Southwestern Bell's motion as to infringement under the doctrine of equivalents and laches. The issues that remain for trial are whether Collins is barred from asserting its patents against Southwestern Bell under the equitable doctrine of laches, whether Southwestern Bell infringed the '589 patent under the doctrine of equivalents, and, if Southwestern Bell is found to have infringed, whether Fujitsu induced its infringement.

SO ORDERED.

SIGNED September 26<sup>th</sup>, 2006

  
JANE J. BOYLE  
UNITED STATES DISTRICT JUDGE